

Abstract

Provided are an apparatus for controlling a switch of a satellite transponder for multibeam communication, and a method thereof. The apparatus and method can increase output efficiency of communicated satellite electric wave signals and reuse frequencies in one-to-one earth station communication or a one-to-multi earth station communication.

The apparatus includes: an earth control station interfacing block for receiving and processing commands from an earth control station, collecting operation states of the switch controlling apparatus and reporting them to the earth control station; a reference frequency generating block for generating a reference clock needed to operate the switch controlling apparatus and generating a reference frequency based on the reference clock; and a switch controlling block for reading contents of a memory storing a switching sequence periodically, detecting and correcting errors of the contents to generate a switch control signal, and transmitting the signal to a radio frequency switch.